Date: Thu, 3 Jun 93 21:07:19 PDT
From: Info-Hams Mailing List and Newsgroup <info-hams@ucsd.edu>
Errors-To: Info-Hams-Errors@UCSD.Edu
Reply-To: Info-Hams@UCSD.Edu
Precedence: Bulk
Subject: Info-Hams Digest V93 #680
To: Info-Hams

Info-Hams Digest   Thu, 3 Jun 93   Volume 93 : Issue 680

Today's Topics:

Send Replies or notes for publication to: <Info-Hams@UCSD.Edu>
Send subscription requests to: <Info-Hams-REQUEST@UCSD.Edu>
Problems you can't solve otherwise to brian@ucsd.edu.

Archives of past issues of the Info-Hams Digest are available
(by FTP only) from UCSD.Edu in directory "mailarchives/info-hams".

We trust that readers are intelligent enough to realize that all text
herein consists of personal comments and does not represent the official
policies or positions of any party. Your mileage may vary. So there.

Date: Thu, 3 Jun 93 16:53:31 -0500
From: sdd.hp.com!saimiri.primate.wisc.edu!caen!malgudi.oar.net!wariat.org!
wariat.org!dreaml!jga@network.UCSD.EDU
Subject: 2 Meters and Airlines
To: info-hams@ucsd.edu

In <C825J6.Inp@srgenprp.sr.hp.com> alanb@sr.hp.com (Alan Bloom) writes:
>Boudreaux Jean A (jab0684@ucs.usl.edu) wrote:

>: I'd be very surpised indeed if 2 meter amateur handhelds caused interference

>: with the instruments or radios on board aircraft. Since the am air band in
>: use by pilots often with handhelds runs from abourt 110 to 137 mhz, I'd
>: be surprised if 144 mhz transmissions were more of a problem.

>If the w meter receiver uses low-side LO injection, then there could well
>be a problem. For example, the popular Radio Shack HTX-202 uses low-side
>injection with a 21.4 MHz IF. Tuning the radio from 144 to 148 MHz
>causes the LO to tune from 122.6 to 126.6 MHz.

Besides, it's not the airplane's voice communications that they are mainly
concerned about.. Your 2m HT might mess up the navagational systems too.

-j

--
Jon Anhold N8USK Dreamland Network Systems
(jga@dreaml.wariat.org) Cleveland, Ohio
(n8usk@n8jnr.#neoh.oh.usa.noam) 44116

Date: Thu, 3 Jun 1993 22:58:04 GMT
From: sdd.hp.com!math.ohio-state.edu!darwin.sura.net!gatekeeper.es.dupont.com!
esds01.es.dupont.com!COLLINST%esvx19.es.dupont.com@network.UCSD.EDU
Subject: BBS For Daily Solar Geo Data
To: info-hams@ucsd.edu

Is there a Dial-In BBS that I can download the Daily Solar Geophysical
Data and/or Propagation Forecast data? I know that the ARRL broadcasts
it at times during the day, but working rotating shifts, I'm not
always at home for the broadcasts.

73, Tom WI3P collinst@esvax.dnet.dupont.com or collinst@holonet.net
***** The comments, opinions, belief, sentiment, views & scribblings ****
***** above this signature are mine, and mine alone. They do not   ****
***** reflect the E.I. DuPont de Nemours Co., Inc., its subsidiaries ****
***** and/or its partners nor its employees or shareholders.   ****

Date: 3 Jun 1993 17:25:12 -0400
From: usc!cs.utexas.edu!utnut!torn!nott!bnrgate!bnr.co.uk!uknet!mcsun!sunic!
psinntp!psinntp!panix!panix!not-for-mail@network.UCSD.EDU
Subject: Bearcat Scanner: Equivalent to 2500XLT-E?
To: info-hams@ucsd.edu

In article <93154.105400RICHARD@auvm.american.edu> <RICHARD@auvm.american.edu>
writes:
>Does anyone know if Bearcat makes (or will make) a base model equivalent
>to the 2500XLT-E handheld?

First, there is no such model as the "2500XLT-E".
The model is 2500XLT. The "-E" suffix an identifier related to the magazine
ad you found it in. Call CE and order a "2500XLT-WQNZRPMX" and see what they say.

The closest equivalent base model is the 8500XLT.

--
Mike Schuster | schuster@panix.com | 70346.1745@CompuServe.COM
------------------- | schuster@shell.portal.com | GEnie: MSCHUSTER

Date: 4 Jun 93 03:43:51 GMT
From: news-mail-gateway@ucsd.edu
Subject: blind VEs
To: info-hams@ucsd.edu

When I heard this story on Newsline the first thing I thought of was
the previous reports of the "Hamgate" sting operation on a ham radio
school in Southern California. The person accused there (Pascal?) was a
blind ham (VE? or did he own the radio school at which the exams were
set). The "charges" were dropped by the FCC citing lack of evidence.

Did this have anything to do with the ruling (or am I just paranoid)?

I am curious to see what position the ARRL takes over this? Any
comments from Newington or will the Bored of Directors make a pronouncement.

As others have pointed out there is no real reason for excluding any
disabled hams from becoming VEs if appropriate accomodations are made.

Kevin Purcell N7WIM / G8UDP
a-kevinp@microsoft.com
"We conjure the spirits of the computer with our spells"

Date: 3 Jun 93 05:28:51 EDT
From: olivea!sgigate!sgiblab!wetware!spunky.RedBrick.COM!psinntp!psinntp!
arrl.org@decwrl.dec.com
Subject: Ham gear/computers/printer/software
To: info-hams@ucsd.edu

I've updated my system and need to do some housecleaning.
Reasonable offers considered.

FOR SALE

Computers, Printer, Software and Amateur Radio Equipment

Computer System #1

Tri-Star 80386/20-MHz system

- o 8 Mb RAM installed on motherboard
- o Slot for additional RAM board
- o Math coprocessor installed
- o Two (2) 65-Mb Mitsubishi hard disk drives
- o One (1) 3.5-inch, 1.44-Mb floppy
- o One (1) 5.25-inch 1.2Mb floppy
- o NEC 3D 14-inch SVGA monitor with tilt/swivel stand
- o Boca Super VGA video card with 1 Mb RAM (ET-4000 chip)
- o 200-Watt power supply
- o Two serial/one parallel/one game port
- o Tower case, floor mount
- o FK-2001 keyboard (nice touch)
- o Operating/technical manuals

System is in *excellent* condition: $1300, or best offer.

Computer System #2

XPC 8088 4.77/8-MHz turbo system

- o Math coprocessor installed
- o Two (2) 360-kb floppy disk drives
- o One (1) 30-Mb hard disk drive
- o BASIC in ROM (use with IBM BASIC/BASICA files)
- o CompuAdd 12-inch mono VGA display (almost new; used little)
- o ATI video card with 512 kb RAM
- o Serial/parallel/game ports
- o Desktop case
- o 200-Watt, double-fan power supply (not the 65-Watt original)
- o Northgate Omnikey Plus keyboard
- o Operating/technical reference manuals

System is in *excellent* condition: $350, or best offer

Other Items available:

Boca SVGAX1 Super VGA card, 1 Mb RAM, 32k colors $100

Epson LQ-850 printer, like new, very little use $350
(Printer is supplied with six (6) new ribbons.)

Computer floor stand for vertical mounting $5

Central Point Copy II Plus Option Board and software, and the

Copy II PC sofware-only version. Both for $40

HP-16C Programmer's Calculator (like new) $35

Vanguard WEFAXTENNA Model APT-2 with low-noise preamp.....$100
In very good condition. One (of eight) ground-plane rod
broken (minor "problem"; no adverse effects). Preamp mounts
internally at the antenna -- protected from the elements,
or you can remove it for in-station use. BNC connectors on
the cables make this very easy to do.

Amateur Radio Equipment:

Millen Grid-Dip Meter, Type No. 90651 S/N 199 .....$50
(with photocopied manual.)

Audio-Noise-Based Voting Circuit $40
(See "QST," Oct, 1992, pages 24-26. Professionally built and
attractive unit. Not aligned; never used.)

LiTZ $50
(See "QST," Nov, 1992, pages 108-110. Professionally built
and attractive unit. Simple feedback fix made. Not aligned,
never used.)

Talking Frequency Display built-up PC board, never used...$30
(See "QST," April 1985, pages 14-17. Professionally built on
commercially made, double-sided PC board. Never used.)

Heath HO-10 monitor scope. Banged up, but parts worth $40

Vanguard WEFAXTENNA Model APT-2 with low-noise preamp.....$100
(In very good condition. One (of eight) ground-plane rod
broken. Preamp mounts internally at the antenna -- protected
from the elements, or you can remove it for in-station use.
BNC connectors on cable make this very easy to do.)

OFS weatherfax board and software $200
(V 2 and 3 software.)

Software available:

Norton Desktop for DOS (unopened) $45

Lotus Magellan (V 2.0) $25

Microsoft Macro Assembler 5.0 .....$50

IBM Macro Assembler 2.0 .....$50

GATO $15
(Action game with a modern edition of Cornelius van Drebble's submersible.)

F-15 Strike Eagle $15
(Action game in which you pilot a recent version of the Wright brothers' invention.)

Reasonable offers considered. (I've already had a couple of *ridiculous* offers.) I'll ship COD, although I prefer pickup of the larger items; it's up to you.

Please provide me with your full address and a daytime (nighttime, if you prefer) phone and/or fax number(s) at which I can reach you.

Thanks.

Paul Pagel/N1FB
American Radio Relay League
225 Main St
Newington, CT 06111
Tel: 203-666-1541; fax: 203-665-7531

Be as considerate of others
as you would have them be
of you. (At least, try . . .)
: Paraphrasing words spoken :
: by the greatest man that :
: ever lives. :

Date: 3 Jun 93 21:56:19 GMT
From: uswnvg!nv6.uswnvg.com!cjackso@uunet.uu.net
Subject: Kenwood vs PK232
To: info-hams@ucsd.edu

A while back, I remember seeing some posts on interference problems with a PK-232 connected to a Kenwood HF rig. Not having either at the time, I didn't keep copies of the article.

Well, I now have a TS-680 and a PK-232, and I can't transmit while the two are connected using the ACC-2 connector (cable and connector from AEA).

Something is causing the HF rig to just lock up key down. When I disconnect
the ACC-2, everything is fine. For recieve only, it also works fine.

Thanks in advance for any suggestions!

--
Clay Jackson - N7QNM
US WEST NewVector Group Inc
Bellevue, WA
uunet!uswnvg!cjackso

Date: 4 Jun 93 00:46:40 GMT
From: news.tek.com!tekgen!danielm@uunet.uu.net
Subject: Mixers (not eggbeaters)
To: info-hams@ucsd.edu

In article <1ul7p9$t56@usenet.rpi.edu> maessm@rpi.edu writes:
>I am looking for information on the design and use of RF mixers. I would ap-
>preciate any direction as to books, magazine articles, etc. that detail the
>design and construction of mixers, and equations to figure out such things as
>LO drive, 3rd-order intercept, etc. I am looking for more than just the Hand-
>book treatment of the subject. (KE4ZV, KH6CP, you guys listening?)
>--
>Mat Maessen   N2NJZ | maessm@rpi.edu

    I do not have a lot of experience in mixer design, however, I can
suggest a few articles and books that may be useful:

"Third-Order Distortion In Amplifiers and Mixers"
S.M. Perlow, RCA Review, June 1976
    Plenty of equations but no design examples. This article dates
back a few years and may be more difficult to find than some of the others.

"Analog Multipliers, Mixers, and Modulators" is chapter 12 from the text "Analog
Integrated Circuits for Communication" by Donald O. Pedersen and Kartikeya
Mayaram.
    This text has example circuits of Gilbert cells as well as bipolar and
FET mixers.

"Mixers in Microwave Systems", Bert Henderson, Microwave Systems News, October
and November 1989.
    This article includes examples of diode mixers.

There is a section on mixers in Chapter 6 of "Introduction to Radio Frequency Design" by Wes Hayward. This book is out-of-print. I am still searching for a used copy - if anyone has a copy they want to sell, send me e-mail!

Motorola app note AN531 covers the MC1596 IC which is used as a mixer in some QRP designs I've seen.

Also, Ed Oxner from Siliconix covers FET mixers in "Designing With Field-Effect Transistors". I think the 3rd edition is currently available.

I hope this is useful as a start, at least until those on the net with practical experience start responding. You know who you are :-)

--
"I am fearful when I see people substituting fear for reason."
-Klaatu, a/k/a Major Carpenter, from "The Day The Earth Stood Still"

Dan Murphy danielm@tekgen.bv.tek.com

Date: Thu, 3 Jun 1993 22:10:53 GMT
From: dog.ee.lbl.gov!overload.lbl.gov!agate!howland.reston.ans.net!darwin.sura.net!rsg1.er.usgs.gov!resdgs1.er.usgs.gov!tbodoh@network.UCSD.EDU
Subject: Mod-server
To: info-hams@ucsd.edu

In article <9306031957.AA21971@ucsd.edu>, bob@ia-ngnet.army.mil (Bob Powers) writes:
|> I have heard of a server that contains a listing of radio mods. Could
|> someone let me know the IP address and the internet site name. I
|> have a Radio Shack Pro 35 scanner and I want to check to see if any mods
|> are available. Either post or send to me direct (bob@ia-ngnet.army.mil).
|>
|> --
|> Bob Powers
|> WO1, Iowa ARNG
|> Database Administrator
|>

--
I am selling crystals which will double the scan/search rate of Uniden BC100/200/205XLT, Tandy PRO-35 and Regency R4020/4030 handheld scanners to 41 ch/sec. Please contact me via email for further info.

The following sites may have the files you seek;

ftp.cs.buffalo.edu		
ucsd.edu	128.54.16.1	/hamradio
nic.funet.fi	128.214.6.100	/pub/ham
csseq.cs.tamu.edu	128.194.2.20	/ham-radio
suntan.tandem.com	130.252.10.8	/hamradio
col.hp.com	15.255.240.16	/packet
talos.cs.buffalo.edu	128.205.32.9	/pub/ham-radio
bubba.business.uwo.ca	129.100.22.42	/hamster/ham
		/hamster/tcpip
		/hamster/mods
		/hamster/view
vax.cs.pitt.edu	130.49.2.1	/pub/arrl8
		/pub/ka9q
		/pub/ncpa
		/pub/tnc2
brolga.cc.uq.oz.au	130.102.128.5	/pub/ka9q
tomcat.gsfc.nasa.gov	128.183.10.100	/public
helios.tn.cornell.edu	128.84.241.2	/pub
wuarchive.wustl.edu	128.252.135.4	/mirrors/msdos/hamradio
		/mirrors/msdos/packet
		/mirrors/msdos/ka9q-tcpip
		/mirrors/cpm/hamradio
		/mirrors/cpm/packet
		/mirrors/misc/hamradio
		/mirrors/misc/packet
		/mirrors/misc/ka9q-tcpip
gatekeeper.dec.com	16.1.0.2	/pub/net/ka9q
sun.soe.clarkson.edu	128.153.12.3	/pub/ka9q
sics.se	192.16.123.90	/archive/packet
		/pub/packet-incoming
sabrina.dei.unipd.it	147.162.2.106	/pub/hamradio
uhunix2.uhcc.Hawaii.Edu	128.171.44.7	/incoming/ham-radio
caticsuf.cati.csufresno.edu	129.8.100.15	/pub/ham-radio
ftp.waseda.ac.jp	133.9.1.32	/pub/toumon/ham-radio
garfield.catt.ncsu.edu	152.1.43.23	/pub/hamradio
plan9.njit.edu	128.235.1.10	/pub/hamradio
sunee.uwaterloo.ca	129.97.128.196	/pub/radio
grivel.une.edu.au	129.180.4.7	/pub/ham-radio
uxc.cso.uiuc.edu	128.174.5.50	/pub/ham-radio
iraun1.ira.uka.de	129.13.10.90	/pub/ham-radio
nic.switch.ch	130.59.1.40	/software/hamradio
		/software/mac/ham-radio
iesd.auc.dk	130.225.48.4	/ham-radio
akutaktak.andrew.cmu.edu	128.2.35.1	/aw0g (softkiss-mac)
??????????	129.69.162.1	/pub (login as ftp

		pkt cluster,usa callbook)
gandalf.umcs.maine.edu	130.111.112.21	/pub/ham-radio # ls -l NO !)
rtfm.mit.edu	18.70.0.226	/pub/usenet/news.answers/radio
tamu.edu	128.194.15.32	/pc-sig
ftp.geo.brown.edu	128.148.116.19	/pub/hamradio

Note also, that Sherrod Munday who frequents the alt.radio.scanner list recently sent me a document on how to add 100 channels to the BC100XLT, which the PRO-35 is a clone of - so it SHOULD work for your scanner. Please contact me if you are interested and I'll email you a copy. Bye...

++
+ Tom Bodoh - Sr. systems software engineer
+
+ USGS/EROS Data Center, Sioux Falls, SD, USA 57198 (605) 594-6830 +
+ Internet; bodoh@dgg.cr.usgs.gov (152.61.192.66)
+
+ "Welcome back my friends to the show that never ends!" EL&P
+
++

Date: Fri, 04 Jun 93 00:57:22 GMT
From: swrinde!emory!rsiatl!jgd@network.UCSD.EDU
Subject: radar gun license
To: info-hams@ucsd.edu

HOFFMANMK@CONRAD.APPSTATE.EDU (Marvin Hoffman) writes:

>The posting concerning no separate, special license for radar is correct.
>If an eligible licensee in the Public Safety services (Local Government,
>Police, Fire, Highway Maintenance, Forestry-Conservation but not Special
>Emergency) has a valid license for its normal two-way radio system, there
>is no requirement for a separate license for speed determining equipment.
>However, the speed determining equipment must conform to the type acceptance
>rules.

>The no separate license would not cover a business or would it allow non-
>type accepted equipment (except for some grandfathered equipment).

I did something no one else here seems to be able to do. I called the local FCC field office and asked. The EIC confirmed what Marvin says.

If you're not a piglet using radar for money harvesting, the situation is, in typical FCC fashion, a bit more complicated. The radar gun must be

licensed just as any other radiolocation transmitter is. This requires
filling out an approximately 12 page (!) license application and worse,
obtaining frequency coordination. Coordination is fairly expensive.
The FCC has a package they will send upon request that has the application
and instructions on coordination. After reviewing this package I
decided it was MUCH easier to simply tweak my X-band radars to the adjacent
ham band and run them as amateur transmitters. BTW, the tweak is so
small as to make less than a half MPH difference in the display.

John
--
John De Armond, WD4OQC |Interested in high performance cars?
Performance Engineering Magazine(TM) | Interested in high tech and computers?
Marietta, Ga | Send ur snail-mail address to
jgd@dixie.com | perform@dixie.com for a free sample mag
The Great Tragedy of the 20th century is that Clinton's name isn't on the Wall.

Date: Thu, 3 Jun 1993 20:59:35 GMT
From: aio!stevel@ames.arpa
Subject: Remote dtmf programming of Kenwood 742/942
To: info-hams@ucsd.edu

Has anyone found any better documentation on remote programming of the
Kenwood 742/942 transcievers. The manual is more than a little sketchy.

Additonally, I'd love to be able to take a pc with an onboard modem, a
repeater database of frequencies in the area, and be able to program the
radio without a lot of button pushing...

less...see... 100 memories x 3 bands x duplex x offset x pltone... looks
like I'm gonna need a new button pushing finger when this is over :-)

Thanks.

73 de N5WHW

Date: Fri, 4 Jun 1993 02:40:20 GMT
From: swrinde!cs.utexas.edu!uwm.edu!linac!att!cbnewse!parnass@network.UCSD.EDU
Subject: Teletype Corp.
To: info-hams@ucsd.edu

Ryan Schweitzer asked:

   > Does anybody know anything about Teletype Corp.? Did they go out of

> business, or are they still thriving?

Teletype Corp, as a discernable entity, is history.

For over 75 years, Teletype Corp was the data communications arm of AT&T.
Headquartered in Skokie, IL, there were Teletype factories in Skokie and
Little Rock, Arkansas.

In the late 1980s, Teletype was folded into the Computer Systems
part of AT&T. The Skokie location was torn down and is now
a shopping center. Some Teletype R&D people now work for Bell Labs,
and some work for NCR (part of AT&T) in Naperville, IL.
Some of the Teletype synchronous projects (and people) were sold off
to Memorex-Telex.

I worked in Research & Development at Teletype Corp from 1978-82 before
transferring to Bell Labs.

Corrections/additions welcome.
--

Date: Thu, 3 Jun 93 21:30:59 GMT
From: concert!news-feed-1.peachnet.edu!umn.edu!gaia.ucs.orst.edu!sequent!
muncher.sequent.com!dale@decwrl.dec.com
Subject: TS-430 problem T/R relay?
To: info-hams@ucsd.edu

I have a Kenwood TS-430 which has recently developed a problem. Often
when I unkey the mic the recieved audio is very weak. Hitting the PTT
again once or twice returns the audio to normal. A friend mentioned
that this was a "well known" problem. Anyone heard of this and know of
a simple fix. Time is scarce before Field Day, but if there is a simple
fix I would like the radio as a backup on Field Day.

Thanks. Dale, N7PEX.

  dale@sequent.com   OR   uunet!sequent!dale
  Dale Mosby   503-578-9842 N7PEX // Sequent Computer Systems, Inc.
  15450 SW Koll Parkway   // Beaverton, Or. 97006-6063
--
  dale@sequent.com   OR   uunet!sequent!dale
  Dale Mosby   503-578-9842 N7PEX // Sequent Computer Systems, Inc.
  15450 SW Koll Parkway   // Beaverton, Or. 97006-6063

Date: Fri, 4 Jun 1993 01:06:29 GMT
From: pravda.sdsc.edu!news.cerf.net!usc!howland.reston.ans.net!torn!csd.unb.ca!
news.ucs.mun.ca!kean.ucs.mun.ca!jcraig@network.UCSD.EDU
Subject: Velocity of light
To: info-hams@ucsd.edu

In article <C828rG.7JJ@avalon.chinalake.navy.mil>, erik@peewee.chinalake.navy.mil
(Erik van Bronkhorst Code C02313 Phone 939-1421)
writes:
> Seth Taylor (taylor@tix.timeplex.COM) wrote:
> : free space), Does anyone out there know why Einstein used the term
> : c in the famous equation, E = mc(squared), where c = velocity of
> : light (300,000 mtrs/sec) ??
> : Seth T. KC2WE
I think that should be km/s. If you want to be exact, c=299,792,458 m/s
>
> Because Einstein was at the same time declaring the velocity of
> light to be Constant. (In fact, a "universal" constant).
>
  My guess is you need light to "c" :-) ... (sorry)
> --
> Erik van Bronkhorst KC6UUT DoD#4342585443 AMA#[classified]
> "Truth is false and logic lost, now the fourth dimension is crossed..."
Joe, VO1NA

Date: Thu, 3 Jun 1993 13:21:25 GMT
From: nwnexus!jhgrud!eskimo!mann@uunet.uu.net
Subject: Velocity of light
To: info-hams@ucsd.edu

In article <9306021339.AA02237@tix.timeplex.com>, taylor@tix.timeplex.COM (Seth
Taylor) writes:
> Although this question is a little removed from ham radio, but still
> related to the subject(radio signals travel at the velocity of light in
> free space), Does anyone out there know why Einstein used the term
> c in the famous equation, E = mc(squared), where c = velocity of
> light (300,000 mtrs/sec) ??
> Seth T. KC2WE

I kind of suspect (but don't know for sure) that he used 'C' in the
equation because part of his theory is that the velocity of light
is a constant.

--

Tom "Old" Mann KD9NL/7 Kirkland, Wash.

End of Info-Hams Digest V93 #680
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